

INFORMATICS INSTITUTE OF TECHNOLOGY

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BSc/ BSc (Hons) in Computer Science

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System Requirement Specification

For

**User Experience Enhancement in Scrum
using Gamification Elements**

By

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Table of Contents

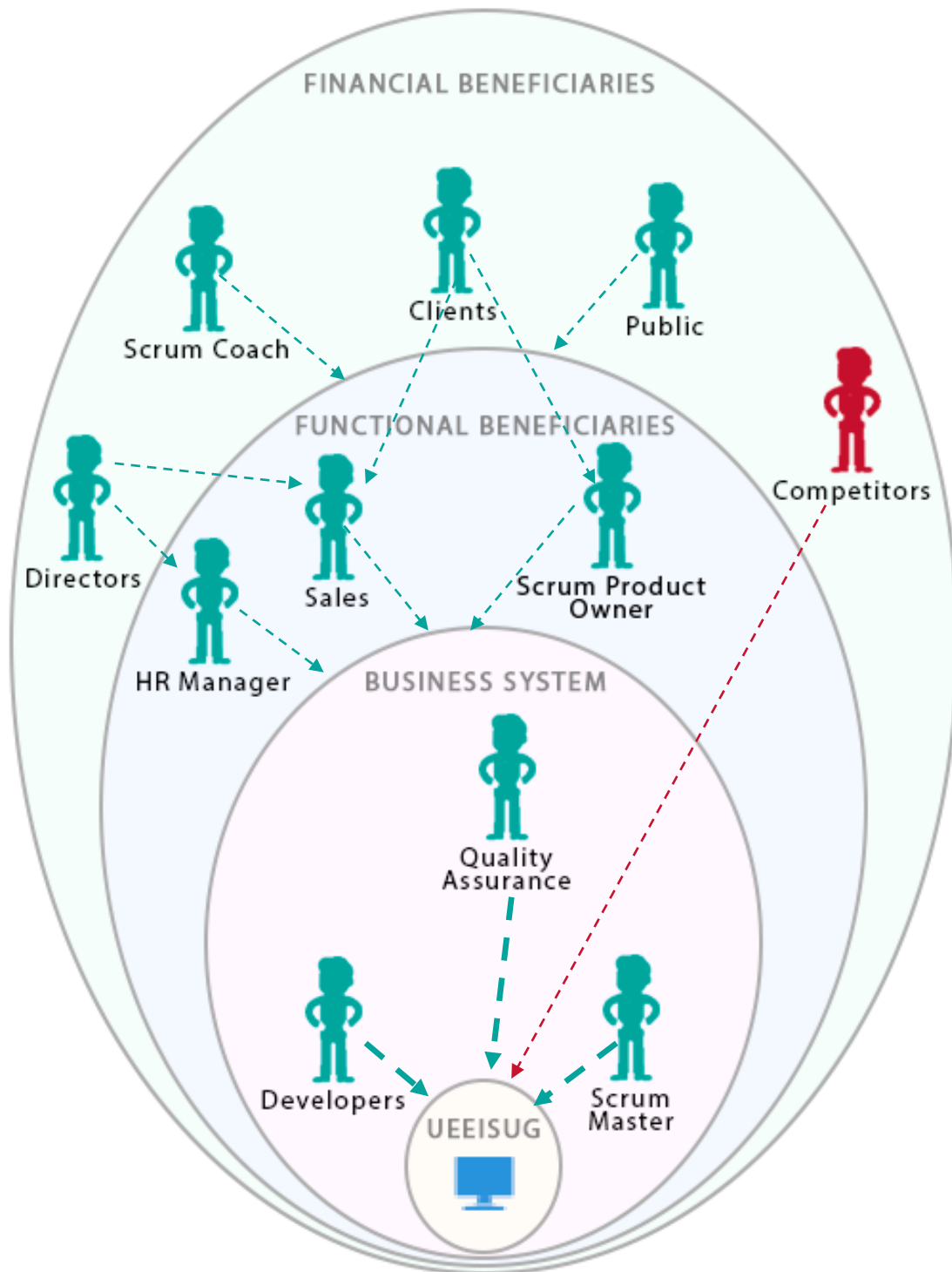
TABLE OF FIGURES	4
1 STAKEHOLDERS	5
1.1 ONION MODEL	5
1.2 STAKEHOLDER DESCRIPTIONS	6
2 REQUIREMENT ELICITATION TECHNIQUES.....	10
2.1 GAMIFICATION ELEMENT SELECTION.....	10
2.1.1 Observation.....	10
2.1.1 Literature review	10
2.2 FUNCTIONAL REQUIREMENT IDENTIFICATION	10
2.2.1 Questioner	10
2.2.2 Interviews.....	10
2.2.3 Literature review	10
3 EXECUTION	10
4 RESULT ANALYSIS	10
5 ANALYSIS MODELS	10
5.1 USE CASE DIAGRAM	10
5.2 USE CASE DESCRIPTIONS	10
5.3 TEST CASES.....	10
5.4 DOMAIN MODEL	11
5.5 ACTIVITY DIAGRAM	11
6 FUNCTIONAL REQUIREMENTS.....	11
7 NONFUNCTIONAL REQUIREMENTS	11
8. OTHER REQUIREMENTS	11
SCOPE REFINEMENT	11

Table of Figures

Figure 1: Onion Model.....	5
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1 Stakeholders

1.1 Onion Model



* UEEISUG - User Experience Enhancement in Scrum using Gamification

Figure 1: Onion Model

1.2 Stakeholder Descriptions

Stakeholder	Developers
Role	Normal Operator
Benefits	<ul style="list-style-type: none">• Tracking Personal Development• Rewards per milestone.• Recognition inside the organization.• Motivation to work.
Interest in Solution	High interest
Responsibilities	<ul style="list-style-type: none">• Journalized daily work carried out by updating the scrum board.

Stakeholder	Quality Assurance
Role	Normal Operator
Benefits	<ul style="list-style-type: none">• Tracking Personal Development• Rewards per milestone.• Recognition inside the organization.• Motivation to work.
Interest in Solution	High interest
Responsibilities	<ul style="list-style-type: none">• Journalized daily work carried out by updating the scrum board.• Inform team about issue in the current version of the product.

Stakeholder	Sales
Role	Functional Beneficiary
Benefits	<ul style="list-style-type: none">• Better products to market.• Increase in quality of the production.
Interest in Solution	Medium interest
Responsibilities	<ul style="list-style-type: none">• Increase the sales.

Stakeholder	Scrum Master
Role	Normal Operator
Benefits	<ul style="list-style-type: none"> • Tracking Personal Development • Rewards per milestone. • Recognition inside the organization. • Motivation to work. • Make it easy to work with scrum team.
Interest in Solution	High interest
Responsibilities	<ul style="list-style-type: none"> • Journalized daily work carried out by updating the scrum board • Check Team's progress. • Know the weight of contributions done by scrum team members

Stakeholder	Scrum Product Owner
Role	Functional Beneficiary
Benefits	<ul style="list-style-type: none"> • Fast Project delivery from the scrum team. • Knowledge about the Scrum team
Interest in Solution	Medium Interest
Responsibilities	<ul style="list-style-type: none"> • Conveying needs of the user to the scrum team.

Stakeholder	HR Manager
Role	Functional Beneficiary
Benefits	<ul style="list-style-type: none"> • Easy to manage human resources. • Early prediction on progress of a newly formed team with old employees.
Interest in Solution	Medium interest
Responsibilities	<ul style="list-style-type: none"> • Optimize HR solutions.

Stakeholder	Directors
Role	Financial Beneficiary
Benefits	<ul style="list-style-type: none"> • Happy work environment increases the productivity of the employees, which eventually lead to upward progress in the production.
Interest in Solution	Medium interest
Responsibilities	<ul style="list-style-type: none"> • Increase the revenue generation.

Stakeholder	Scrum Coach
Role	Financial Beneficiary
Benefits	<ul style="list-style-type: none"> • Profit increment. (With the increase in using of scrum methodology due to this system. More organizations will thrive to learn the scrum methodology.) • Increase in demand in job market.
Interest in Solution	Medium interest
Responsibilities	<ul style="list-style-type: none"> • Teach about scrum methodology.

Stakeholder	Public (Society)
Role	Financial Beneficiary
Benefits	<ul style="list-style-type: none"> • Health improvements due to less stress due to employee satisfaction.
Interest in Solution	Interest
Responsibilities	

Stakeholder	Competitors (Negative Stakeholder)
Role	Financial Beneficiary
Benefits	<ul style="list-style-type: none"> • Know the market's responses to the current problem. • Learn from competitors mistakes
Interest in Solution	Medium interest
Responsibilities	

Stakeholder	Hacker (Negative Stakeholder)
Role	Financial Beneficiary
Benefits	<ul style="list-style-type: none"> • Know the market's responses to the current problem. • Learn from competitors mistakes
Interest in Solution	Medium interest
Responsibilities	<ul style="list-style-type: none"> • Teach about scrum methodology.

2 Requirement elicitation techniques

2.1 Gamification element selection

In order to identify what is the most relevant gamification element for the problem the author has used following elicitation techniques;

2.1.1 Observation

2.1.1 Literature review

2.2 Functional requirement identification

To identify the necessary functionalities of system, the author has used the following elicitation techniques;

2.2.1 Questioner

2.2.2 Interviews

2.2.3 Literature review

3 Execution

4 Result analysis

5 Analysis models

5.1 Use case diagram

5.2 Use case descriptions

5.3 Test cases

5.4 Domain model

5.5 Activity Diagram

6 Functional requirements

6. Functional requirements (FR no., FR, Input, process, output, priority, Use case) - all low-level functions

7 Nonfunctional requirements

7. Nonfunctional requirements

8. Other requirements

Scope refinement

